## **Abstract**

A synergistic herbicidal mixture comprising

A) at least one 3-heterocyclyl-substituted benzoyl derivative of the formula I

$$\begin{array}{c|c}
R^6 & & & \\
N & & & \\
N & & & \\
N & & & \\
P^5 & & & \\
\end{array}$$

$$\begin{array}{c}
R^1 \\
R^2 \\
R^3 \\
\end{array}$$

in which the variables have the following meanings:

R<sup>1</sup>, R<sup>3</sup> are halogen, alkyl, haloalkyl, alkoxy, haloalkoxy, alkylthio, alkylsulfinyl or alkylsulfonyl;

R<sup>2</sup> is a optionally substituted heterocyclic radical selected from the group: isoxazol-3-yl, isoxazol-4-yl, isoxazol-5-yl, 4,5-dihydroisoxazol-3-yl, 4,5-dihydroisoxazol-3-yl;

R<sup>4</sup> is hydrogen, halogen or alkyl;

R<sup>5</sup> is alkyl;

R<sup>6</sup> is hydrogen or alkyl;

or one of its environmentally compatible salts;

and

B) at least the compound of formula IIa

or one of its environmentally compatible salts;

or

the compound of formula IIb

or one of its environmentally compatible salts;

and, if desired,

C) at least one further herbicidal compound;

in a synergistically effective amount.

Compositions comprising these mixtures, processes for the preparation of these compositions, and their use for controlling undesired plants.